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Please find below and/or attached an Office communication concerning this application or proceeding.

		Application	No.	Applicant(s)			
Office Action Summary		09/889,086		ICHIKAWA ET AL.			
		Examiner		Art Unit			
		Sam Bhattac	harya	2688			
The MAILING DATE of this Period for Reply	communication appe	ears on the co	over sheet with the c	orrespondence address			
A SHORTENED STATUTORY P WHICHEVER IS LONGER, FRO Extensions of time may be available under the after SIX (6) MONTHS from the mailing date If NO period for reply is specified above, the Failure to reply within the set or extended period and the same of the sa	M THE MAILING DA ne provisions of 37 CFR 1.130 of this communication. maximum statutory period wi riod for reply will, by statute, ree months after the mailing	ATE OF THIS 6(a). In no event, fill apply and will ex- cause the applicat	COMMUNICATION however, may a reply be tim topire SIX (6) MONTHS from topic to become ABANDONED	l. ely filed the mailing date of this communication. D (35 U.S.C. § 133).			
Status							
<ul> <li>1) Responsive to communicate</li> <li>2a) This action is FINAL.</li> <li>3) Since this application is in closed in accordance with</li> </ul>	2b)⊠ This condition for allowan	action is non ice except foi	formal matters, pro				
Disposition of Claims							
4)  Claim(s) 1-4 and 6-10 is/ar 4a) Of the above claim(s) _ 5)  Claim(s) is/are allow 6)  Claim(s) 1-4 and 6-10 is/ar 7)  Claim(s) is/are object 8)  Claim(s) are subject Application Papers  9)  The specification is objected 10)  The drawing(s) filed on Applicant may not request tha Replacement drawing sheet(s 11)  The oath or declaration is o	is/are withdraw red. e rejected. cted to. to restriction and/or d to by the Examiner is/are: a) acce t any objection to the d ) including the correction	r. epted or b) drawing(s) be hon is required	uirement. objected to by the E neld in abeyance. See if the drawing(s) is obj	37 CFR 1.85(a). ected to. See 37 CFR 1.121(d).			
Priority under 35 U.S.C. § 119							
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents have been received.</li> <li>2. Certified copies of the priority documents have been received in Application No.</li> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>							
Attachment(s)  1) Notice of References Cited (PTO-892)  2) Notice of Draftsperson's Patent Drawing  3) Information Disclosure Statement(s) (PTO-892)		5)	Interview Summary ( Paper No(s)/Mail Dal Notice of Informal Pa				

### **DETAILED ACTION**

### Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 10/6/05 has been entered.

## Claim Rejections - 35 USC § 112

- The following is a quotation of the second paragraph of 35 U.S.C. 112:
   The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 3. Claims 3, 4 and 6 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
- 4. Claims 3 and 4 recite the limitation "state sensor means" in lines 3 and 4, respectively.

  There is insufficient antecedent basis for this limitation in the claim.
- 5. Claim 4 recites the limitation "location information detecting means" in line 4. There is insufficient antecedent basis for this limitation in the claim.
- 6. The meaning of the phrase "means for distinguish information whether the information is transmitted from said on-vehicle terminal main unit or ... from said mobile terminal... to location information of each point" in lines 2-6 of claim 6 is not clear.

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7. Claim 6 recites the limitation "information" in lines 2-4 and 6. There is insufficient antecedent basis for this limitation in the claim.

## Claim Rejections - 35 USC § 103

- 8. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
- 9. Claims 1-4 and 7-10, as best understood in view of the rejection under 35 U.S.C. 112, 2nd paragraph, above, is rejected under 35 U.S.C. 103(a) as being unpatentable over Yoshida et al. (JP Patent 11-312285, Machine Translation) in view of Tognazzini (U.S. Patent 5,914,675).

As to claim 1, Figures 1-3 in Yoshida show an on-vehicle communication system including first radio communication means 23 for transmitting predetermined data having state information in the detection of an abnormal state, the predetermined location information and a terminal ID to an information service center on occurrence of a predetermined event,

wherein said on-vehicle communication system comprises an on-vehicle terminal main unit, a mobile terminal 36 detachable from said on vehicle terminal main unit, wherein said mobile terminal 36 includes voice communication means 36,

wherein said on-vehicle terminal main unit and said mobile terminal can communicate with each other via second radio communication means 35; and

wherein if the mobile terminal has finished having the first radio communication means transmit the predetermined data to the information service center, the mobile terminal has the second radio communication means transmit data for voice communication to the information service center via the on-vehicle terminal main unit ("first radio-transmission means b which

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said radio means transmits emergency intelligence to said emergency relief center in data communication from said car at the time of occurrence of the accident. It is characterized by having at least the second radio-transmission means which makes voice communication possible in said emergency relief center from said car by automatic change at the time of the data communication termination by said first radio-transmission means." See paragraphs [0005], [0013] to [0015], [0022] and [0025] and Figures 1-3).

Yoshida does not disclose means for detecting a relative distance between said on-vehicle terminal main unit and said mobile terminal, wherein said means switches a main system for communications of said on-vehicle communication system. The Tognazzini reference teaches means for detecting a relative distance between an on-vehicle terminal main unit and a mobile terminal, wherein said means switches a main system for communications of said on-vehicle communication system. See FIGS. 1 and 2B, and col. 4, lines 20-25, col. 7, lines 28-32, col. 8, lines 59-63 and col. 9, lines 7-11.

Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the system of Yoshida to have means for detecting a relative distance between an on-vehicle terminal main unit and a mobile terminal, wherein said means switches a main system for communications of said on-vehicle communication system, as taught by Tognazzini, in order to help rescuers in locating the area/region of a crash/emergency and in communicating with users of the on-vehicle communication system in an emergency.

As to claim 2, the Tognazzini reference discloses "the GPS receiver 16 may be integrated as part of the emergency locator device, where the emergency locator device 10 operates as an integrated wireless telephone having the GPS receiver 16" (Col. 4, lines 30-33).

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Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the system of Yoshida-Tognazzini wherein the system further comprises location information detecting means as a function of said mobile terminal, as further taught by Tognazzini, in order to implement the system as a portable unit suitable for hand-held use for survivors of a crash.

As to claim 3, the Tognazzini reference discloses "the GPS receiver 16 may be integrated as part of the emergency locator device, where the emergency locator device 10 operates as an integrated wireless telephone having the GPS receiver 16" (Col. 4, lines 30-33). "The emergency locator device includes a GPS receiver interface, a crash sensor or manual triggering device" (Col. 3, lines 65-67).

Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the system of Yoshida-Tognazzini wherein the mobile terminal further includes a function of the state sensor means, as further taught by Tognazzini, in order to implement the system as a portable unit suitable for hand-held use for survivors of a crash.

As to claim 4, the Tognazzini reference discloses "the emergency locator device includes a GPS receiver interface, a crash sensor or manual triggering device" (Col. 3, lines 65-67). "The GPS receiver 16 may be integrated as part of the emergency locator device, where the emergency locator device 10 operates as an integrated wireless telephone having the GPS receiver 16" (Col. 4, lines 30-33).

Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the system of Yoshida-Tognazzini wherein the mobile further

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includes functions of the location information detecting means and the state sensor means, as further taught by Tognazzini, in order to implement the system as a portable unit suitable for hand-held use for survivors of a crash.

As to claim 7, as cited in claim 1, Figures 1-3 in Yoshida show an on-vehicle communication system including location information detecting means 22; state sensor means 21 for detecting an abnormal state and outputting state information; means 24 for recording location information having time information and latitude/longitude information of the location information obtained by the location information detecting means 22 at each point; first radio communication means 23 for transmitting predetermined data having the state information, the predetermined location information and a terminal ID to an information service center 2 on occurrence of a predetermined event; and voice communication means 36,

wherein said on-vehicle communication system comprises an on-vehicle terminal main unit and a mobile terminal 36 detachable from said on-vehicle terminal main unit, and wherein said mobile terminal 36 includes voice communication means 36, and wherein said on-vehicle terminal main unit and said mobile terminal can communicate with each other via second radio communication means 35.

However, it does not disclose the mobile terminal includes data retaining means for temporarily storing data and the data retaining means temporarily stores data updated as required while the vehicle is traveling. The Tognazzini reference (Figure 1) discloses "the GPS receiver 16 thus determines a current location of the emergency locator device 10 within an accuracy of +/-100 meters and supplies the current location information to the GPS interface 14 for storage in memory" (Col. 4, lines 54-57). "If the received data is GPS data, the control processor 24a

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accesses the previously-stored GPS data from the memory 38a in step 104, and compares the received GPS data with the stored GPS data in step 106. If the variations between GPS data indicate that the device 10 has moved at least a predetermined distance, for example, a distance L=100 meters, the control processor 24a updates the memory 38a in step 108" (Col. 7, lines 24-32).

Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the system of Yoshida wherein the mobile terminal includes data retaining means for temporarily storing data and the data retaining means temporarily stores data updated as required while the vehicle is traveling, as taught by Tognazzini, so that if the mobile terminal becomes separated from the vehicle during a crash, the control processor in the mobile terminal can still provide location and vehicle status information to rescue teams by accessing the memory.

As to claim 8, Yoshida-Tognazzini discloses the on-vehicle communication system according to claim 7. The Tognazzini reference further discloses the data retaining means stores higher priority emergency information data to be transmitted to the information service center, and the emergency information data stored in the data retaining means can be taken out of the vehicle together with said mobile terminal in the event of an emergency ("the GPS receiver 16 thus determines a current location of the emergency locator device 10 within an accuracy of +/-100 meters and supplies the current location information to the GPS interface 14 for storage in memory" (Col. 4, lines 54-57). "Finally, the telephone portion of the emergency locator device 10 and the emergency receiver each include a non-volatile memory 38 that stores a predetermined number corresponding to a rescue station" (Col. 5, lines 20-23). "If the

emergency locator device 10 becomes separated from the rest of the vehicle during a crash, the control processor 24a can still provide location and vehicle status information to rescue teams by accessing the memory 38a" (Col. 5, lines 56-60)).

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As to claim 9, Yoshida-Tognazzini discloses the on-vehicle communication system according to claim 8. The Yoshida reference further discloses the on-vehicle communication system makes voice communication with the information service center after transmitting the emergency information data to the information service center from the mobile terminal ("when an emergency occurs in a vehicle due to accident, etc., the detailed content of the accident is notified to an emergency aid center by first executing the position information of own vehicle, accident information, and furthermore, such emergency information as vehicle ID and crew ID information, etc., stored in advance are notified through radio data communication by a first radio transmission means 33, and automatically switching the data communication to voice communication by a second radio transmission means 35, when the data communication is completed" (Abstract). "The 2nd radio-transmission means 35 is connected to a handset (or hand free set) 36" (paragraph [0015], line 6)).

As to claim 10, Yoshida-Tognazzini discloses the on-vehicle communication system according to claim 9. The Tognazzini reference further discloses communications from the mobile terminal to the service center are made via a communication apparatus different from said on-vehicle communication system associated with said mobile terminal, the communication apparatus existing in the close proximity of said mobile terminal ("the portable device 10 may also be used as a conventional wireless telephone during normal operations" (Col. 8, lines 48-50). "The telephone portion of the emergency locator device 10 and the emergency receiver each

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include a non-volatile memory 38 that stores a predetermined number corresponding to a rescue station" (Col. 5, lines 20-23). "Upon the detection of an emergency trigger, the emergency locator device automatically places a wireless telephone call to a predetermined emergency number and supplies the stored location data and vehicle condition data" (Col. 10, lines 47-51). "If the emergency locator device 10 becomes separated from the rest of the vehicle during a crash, the control processor 24a can still provide location and vehicle status information to rescue teams by accessing the memory 38a" (Col. 5, lines 56-60)).

#### Allowable Subject Matter

- Claim 6 would be allowable if rewritten to overcome the rejection(s) under 35 10. U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.
- The following is a statement of reasons for the indication of allowable subject matter: as 11. best understood in view of the rejection under 35 U.S.C. 112, 2nd paragraph, the prior art fails to disclose the recited combination of elements in an on-vehicle means for distinguishing whether the information is transmitted from said on vehicle terminal main unit or the information is transmitted from said mobile terminal when said service center receives and restores information transmitted from a plurality of types of on-vehicle communication systems according to a predetermined communication protocol, as in claim 6.

## Response to Arguments

12. Applicant's arguments filed 10/6/05 have been fully considered but they are not persuasive.

Regarding claim 1, Applicant argues that the Yoshida and Tognazzini references do not teach or suggest an on-vehicle communication system including means for detecting a relative distance between the on-vehicle terminal main unit and the mobile terminal, wherein the means switches a main system for communications of the on-vehicle communication system. Applicant further argues that Tognazzini is not an on-vehicle system and does not determine a distance between the portable locator device 10 and the terminal main unit, and does not teach an on-vehicle system having means or switching a main system for communications of the on-vehicle communication system.

Examiner respectfully disagrees. Tognazzini discloses a control processor that accesses digital map databases to provide a geographical display based on received GPS data. The GPS interface 14 in the locator device 10 receives digital location data indicating a current location of the current location of the locator device 10 from a wireless location data receiver 16. In one embodiment, the locator device 10 is implemented as a wireless telephone that receives the location data from the external GPS receiver 16 (which can be in a vehicle) that can be disconnected from the telephone portion. Here, the locator device 10 and the receiver 16 correspond to the claimed "mobile terminal" and "on-vehicle terminal main unit," respectively. The GPS data indicates the distanced moved by the locator device. See col. 4, lines 20-25 and col. 7, lines 28-32. Moreover, when accessing digital map databases to provide a geographical display the control processor 24b effectively switches a main system during normal operation for

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communications of the on-vehicle communication system. Accordingly, Examiner maintains that the GPS system of Tognazzini can be used to detect the relative distance between an on-vehicle terminal main unit and the mobile terminal and teaches an on-vehicle system having means or switching a main system for communications of the on-vehicle communication system, as set forth in claim 1.

Regarding claims 3 and 4, Applicant argues that Tognazzini does not disclose that the portable locator device 10 includes a function of a state sensor means.

Examiner respectfully disagrees. Tognazzini states that the "emergency locator device includes a GPS receiver interface, a crash sensor or manual triggering device." See col. 3, lines 65-67. The emergency locator device in Tognazzini corresponds to the claimed mobile terminal. Since the crash sensor is a state sensor means, the mobile includes a function of a state sensor means, as set forth in claims 3 and 4.

Regarding claim 7, Applicant argues that neither Yoshida nor Tognazzini disclose a mobile terminal having voice communication means and data retaining means for temporarily storing data and wherein an on-vehicle terminal main unit and the mobile terminal can communicate with each other via a second radio communication means.

Examiner respectfully disagrees. The hand set 36 and the cellular phone unit 32 in Yoshida et al. do communicate with each other because the hand set 36 transmits data to the cellular phone unit 32. Moreover the second radio transmission means 35 makes voice communication possible in an emergency relief center from the car by automatic change at the time of the data communication termination by the first radio transmission means 33. See paragraph [0008], lines 15-18. Examiner relies on Tognazzini, not Yoshida, for a teaching of

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mobile terminal including data retaining means. In response to applicant's arguments against the references individually, one cannot show nonobviousness by attacking references individually where the rejections are based on combinations of references. See In re Keller, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); In re Merck & Co., 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986). The hand set of Yoshida and the portable locator device of Tognazzini are analogous fields of endeavor because both use wireless radio communications. One skilled in the art would therefore have looked to Tognazzini to modify the teachings of Yoshida et al. for the reasons stated in the rejection. Accordingly, the applied references teach the limitations recited in claim 7.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sam Bhattacharya whose telephone number is (571) 272-7917. The examiner can normally be reached on Weekdays, 9-6, with first Fridays off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, George Eng can be reached on (571) 272-7495. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

sb

GEORGE ENG